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YUN et al.(10) **Pub. No.: US 2017/0098672 A1**(43) **Pub. Date: Apr. 6, 2017**(54) **IMAGE SENSOR INCLUDING COLOR  
SEPARATION ELEMENT****Publication Classification**(51) **Int. Cl.**  
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LTD.**, Suwon-si (KR)(21) Appl. No.: **15/287,097**(22) Filed: **Oct. 6, 2016**(30) **Foreign Application Priority Data**

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(57) **ABSTRACT**

An image sensor includes a pixel array including a first pixel row, in which a plurality of first pixels and a plurality of second pixels are alternately arranged, and a second pixel row, in which a plurality of second pixels and a plurality of third pixels are alternately arranged; first color separation elements configured to allow light having a second wavelength band, among incident light, to pass therethrough and travel in a downward direction, and to allow a mixture of light having a first wavelength band and light having a third wavelength band, among the incident light, to pass there-through and travel in a lateral direction; and first color filters on at least a portion of the plurality of first pixels, the first color filters being configured to transmit only the light having the first wavelength band.

